

REMARKS

In response to the Office Action dated July 16, 2004, Applicant respectfully requests reconsideration and withdrawal of the rejection of the claims. The indication that claims 3, 5, 6 and 8 contain allowable subject matter is noted with appreciation. The rewriting of these claims in independent form is being held in abeyance, pending consideration of this response.

The Office Action requests Figures 2-4 to be labeled as "Prior Art". In response thereto, a replacement sheet containing the appropriate legends for these figures is being submitted.

Claims 1, 3, 5 and 8 were objected to, on the basis of minor informalities. These claims have been amended to remove the bases for the objections.

Claims 1, 2, 4 and 7 were rejected under 35 U.S.C. § 102, on the grounds that they were considered to be anticipated by the Bastiani et al. patent. The claims are directed to a method for conveying commands from a terminal to a portable electronic object, such as a smart card. As explained in the background portion of the application, the exchange of information between a terminal and a smart card takes place by means of a protocol which employs Application Protocol Data Units (APDUs) to transmit commands from the terminal to the card and responses from the card to the terminal. Each command includes a header, and an optional data field. Each response has a trailer, as well as an optional data field. The claimed invention enables transmissions which conform to this protocol to be conveyed over a standardized universal serial bus (USB) that connects microcomputers to peripherals.

Claim 1 recites that each downlink transaction, i.e., from the terminal to the portable electronic object, comprises three successive packets of information. Referring to the embodiment depicted in Figure 5, these three packets respectively comprise a token packet OUT that is transmitted from the terminal TE to the portable electronic object CA, a data packet DATA0 transmitted from the terminal to the object, and a handshake packet ACK transmitted from the portable electronic object to the terminal.

The claim also recites that each uplink transaction comprises three packets. Referring again to the exemplary embodiment of Figure 5, the uplink transaction comprises a token packet IN transmitted from the terminal to the object, a data packet DATA1 transmitted from the object to the terminal, and a handshake packet ACK transmitted from the terminal to the object.

Claim 1 further recites that the header of each command is encapsulated in the data field of a data packet for a downlink transaction. As shown in the example of Figure 5, the header comprises the respective bytes CLA, INS, P1 and P2, which are located in the data field of the data packet DATA0. The claim further recites that the trailer of each response is encapsulated in the data field of the data packet of an uplink transaction. In Figure 5, the trailer is represented by the bytes SW1 and SW2, located in the data field of the uplink data packet DATA1.

In pertinent part, the rejection of claim 1 refers to the Bastiani patent at column 38, lines 26-37, which pertains to the command and status access illustrated in Figure 36. Unlike the claimed invention, this portion of the patent does not disclose downlink and uplink transactions which each comprise three successive packets of information. Rather, in the operation of the Bastiani patent, a downlink,

transaction comprises only two packets, namely a data packet OUTDATA0 and an acknowledgment packet ACK. There is no disclosure of a token packet which precedes the data packet.

In rejecting the claim, the Office Action alleges that the packet OUTDATA0 comprises a token packet. However, this packet is the same as that which has been identified as the data packet in the Office Action. Claim 1 clearly recites two distinct packets that are successively transmitted from the terminal to the object in each downlink transaction. It is respectfully submitted that the *single* packet OUTDATA0 that is disclosed in the Bastiani patent cannot constitute the two distinct packets recited in the claim. In other words, the Bastiani patent only discloses a data packet that is transmitted from the terminal to the object, and contains no disclosure of a token packet which precedes the data packet. The Office Action has not identified any disclosure suggesting that this single data packet of the Bastiani patent is the same as, or equivalent to, the two distinct packets recited in claim 1.

For at least this reason, therefore, the Bastiani patent does not anticipate the subject matter of claim 1, nor any of its dependent claims.

Claim 2 recites that *each* token packet contains an identifier indicating the direction of the transfer of the data packet that succeeds it in a transaction. In rejecting this claim, the Office Action refers to the INSTART packet shown in Figure 36 of the Bastiani patent. This packet was identified, in the rejection of claim 1, as corresponding to the token packet of an uplink transaction. In addition to the token packet for an uplink transaction, claim 1 also defines a token packet for a downlink transaction. Since claim 2 recites that *each* token packet contains an identifier, this means that *both* the downlink token packet and the uplink token packet contain such

an identifier. The Office Action does not identify a downlink token packet containing such an identifier. As noted previously, the Bastiani patent does not disclose a token packet that is used in connection with a downlink transaction. For this additional reason, therefore, the subject matter of claim 2 is not anticipated.


Claim 4 has been amended to clarify that the plurality of successive transactions each provide a portion of a command or a response. For instance, Figure 7 illustrates an example in which a command is transmitted in a downlink transaction over two successive transactions, in which the first transaction provides the beginning of the command and the second transaction provides the remainder of the command. It is respectfully submitted that this claimed subject matter is not anticipated by the Bastiani patent.

For at least the foregoing reasons, it is respectfully submitted that the presently pending claims are patentable over the Bastiani patent. Reconsideration and withdrawal of the rejection of claims 1, 2, 4 and 7, and allowance of all pending claims are respectfully requested.

Respectfully submitted,

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